

Amendments to the Specification:

Please replace the Abstract of the application with the following new Abstract. A clean copy of the new Abstract is provided on a separate sheet after the Remarks section of this document:

Described herein are systems and methods for determining the cardiac output of a patient. One such method includes measuring the patient's height and the velocity time integral or stroke distance of blood flowing from the heart of the patient, and subsequently utilising these measurements to determine the cardiac output of the patient based on a valve cross sectional area estimate.

Please replace the title of the present application with the following new title:

METHODS AND SYSTEMS FOR DETERMINING CARDIAC OUTPUT BASED ON
A VALVE CROSS SECTIONAL AREA ESTIMATE

Please amend the paragraph beginning page 5, line 19 of the present specification as follows:

Fig. 4 therefore illustrates a flowchart 20 of the steps involved in the preferred embodiment. Firstly, the height of the patient is determined at 21. Next, from the output screen dump of the transducer monitoring device, the heart rate is determined at 22 and the velocity time integral is measured at 23. These parameters are then utilised to calculate the corresponding AV and PV diameter which can then be utilised to calculate the cardiac output at 24.